

# ULTRASOUND

The memory chip included in this package is a 40-pin, 256K x 16, SOJ, surface mount DRAM (80 nsec.). All you need to do to upgrade your UltraSound from 512K to 1 MB is to install this chip.

## Installing Memory

*Caution! Turn off your computer and ground yourself by touching the computer's metal chassis to avoid damaging your card, the memory chip, or computer with static charges.*

1. Remove the UltraSound card.

The memory socket is located on the UltraSound card at the far end from the metal bracket.

Notice that one corner of the memory socket is beveled (angled – see figure at right). This corner is labeled Pin 1.

You will also notice that your memory chip has an arrow pointing to its Pin 1.

## Installing Your Memory Upgrade

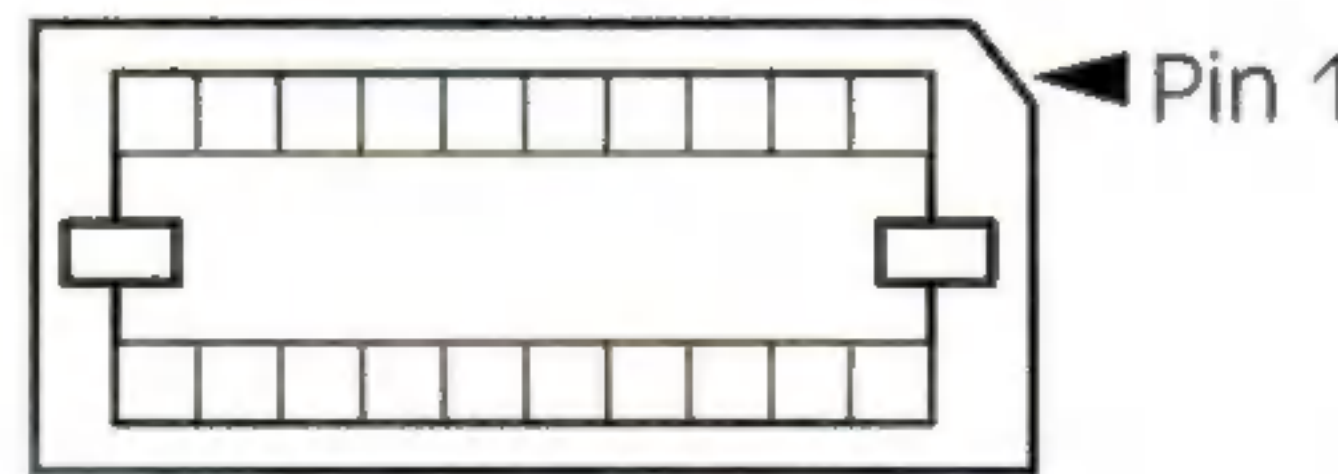


256K x 16-bit (40-pin)  
memory chip (top view)

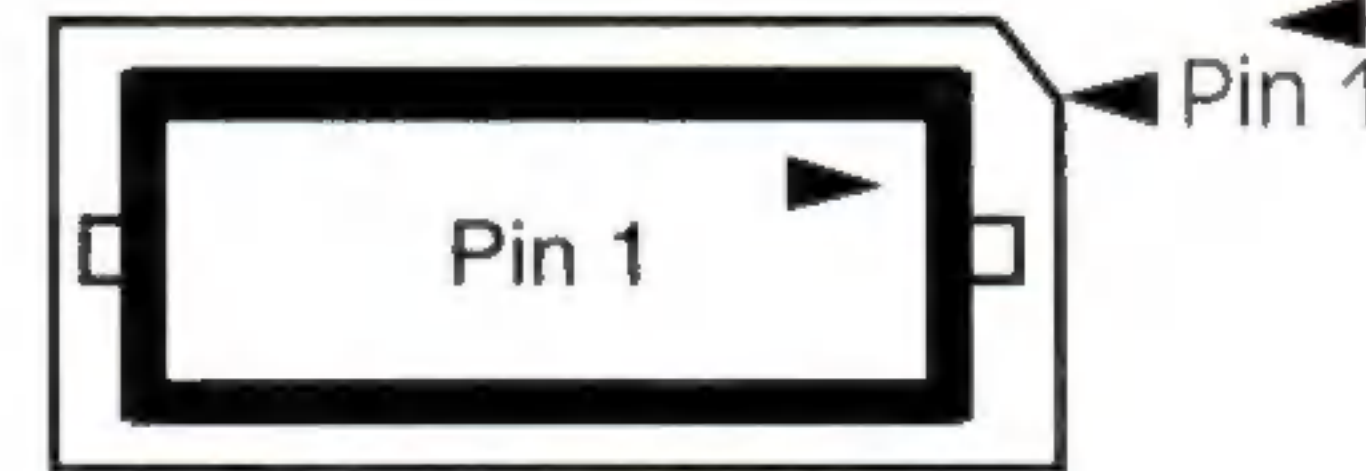


Memory chip (side view)

*Match  
beveled  
edges  
(Pin 1)  
on chip  
and  
socket*



Memory socket on card



Installed memory

2. Place the chip into the open socket on the UltraSound card, matching the arrows. Make sure that the label on top of the chip is facing as shown.
3. Press firmly until all of the pins are secure in the socket, and the top of the chip is flush with the top of the socket.

*Caution! Before you turn on your computer, double check that you have installed the chip correctly.*

*If you install a chip backwards, it will heat up and may cause damage to your UltraSound card or other components in your computer.*



## Testing the Installation

When you install your memory upgrade, UltraSound automatically detects the amount of memory installed. To test the installation:

1. Reinstall the UltraSound card.  
Refer to your Installation Guide.
2. From your UltraSound directory, type: SETGUS -i. This runs the UltraSound Setup program.  
Choose *Advanced*, then *Diagnostics*.
3. In the Diagnostics section of the Setup program, select *Check DRAM* to test your UltraSound's memory.
4. When the memory test is finished, press <Esc> to leave the program.

## Technical Support

Technical support is available to all owners of Advanced Gravis products.

If you need help installing your memory upgrade, you can call Gravis

Technical Support from 8:30 AM – 4:00 PM Pacific Coast Time.

Telephone: (604) 431-1807

Fax: (604) 451-9358

You can contact Advanced Gravis by modem at the following addresses:

*CompuServe®:*

GO PCVENB area #14

*Advanced Gravis BBS:*

(604) 431-5927 (V32bis N81)

(604) 431-7553 (28.8 V.FC N81)

*Internet:*

tech@gravis.com

*FidoNET:*

1:153/978

*FTP:*

archive.epas.utoronto.ca  
pub/pc/ultrasound

*Internet Mail List:*

gus-general-request@mail.orst.edu  
subscribe

*AOL (America On-line):*

email Adv Gravis  
go keyword Gravis

When contacting Gravis via electronic mail, it is important that you provide all the information described in the next section. Otherwise, it will take longer to get back to you with an answer.

## Technical Support Tips

1. Call from a phone where you have access to your computer.
2. Please prepare the following information:
  - Your name, address, and telephone number
  - The make and model of your computer
  - Your system software and version
  - A detailed explanation of the problem

*Advanced*  
**GRAVIS**

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